ENVIRONMENTAL ASSESSMENT Case File No.: AA-077723 AK-040-02-EA-015

Applicant: Bureau of Land Management

Type of

Action: Runway Rehabilitation

Location: Campbell Tract; Seward Meridian, T. 12 N., R. 3 W., Sections 2 and 3.

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Preparing

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I. INTRODUCTION

The Campbell Tract Facility (CTF) Airfield is located on the Campbell Tract (CT) east of Abbott Loop Road and south of Tudor Road. The airfield elevation ranges between 225 and 290 feet above sea level. The runway is classified as "Private" with use by permission from BLM only. Current agency uses include limited fixed-wing use for field projects and Office of Aircraft Services (OAS) helicopter and fixed-wing training. The airstrip may also be used for emergency landings by general aviation.

The airfield's primary purpose is to support the Alaska Disaster Medical Assistance Team and the Department of Interior (DOI) aircraft for emergency response throughout Alaska. The airfield is also identified as an emergency pickup location for federal, state, and local initial disaster responders under the Alaska National Guard Emergency Transportation Plan. In the event of a catastrophic earthquake or any other disaster, the CT runway could handle medium sized disaster relief aircraft such as the C-130 Hercules. The CT runway could be easily and quickly repaired with on-site equipment. Helicopters will also operate at this airfield during emergency and disaster operations. The most common helicopters using the airfield will likely be the Bell 212 and the UH-60 Black Hawk. The airfield consists of a 5,000 foot long by 150 foot wide unpaved runway, an unpaved taxiway, and a 225' by 500' vehicle/aircraft parking apron and a helicopter operations area with six paved pads.

A. <u>Purpose and Need for the Proposed Action:</u>

As the airfield was constructed many years ago to unknown standards and has not received much maintenance in recent years, it now requires extensive improvements to comply with current criteria used for emergency and disaster response operations. Currently, overgrown brush and fairly tall trees encroach along the edges of the runway throughout the site. There are several soft spots along the landing surface caused by poor drainage over the runway's surface. Over a year ago, vegetation was cleared from the runway and the surface regraded to provide a more usable operation surface. Numerous roots and sizeable cobbles still protrude from the runway surface. The runway appears very flat in the transverse direction and does not have sufficient slope to effectively drain runoff. Several soft areas have been identified in the runway. The existing taxiway is approximately 75 feet wide by 445 feet long. The apron is approximately 225 feet wide and 500 feet long. Vegetation encroaches along most of the taxiway and apron edges. The taxiway which joins the runway to the apron has a considerable slope, whereas the apron appears to have gradual, but marginal slope.

Rehabilitating the runway would require improvements to the runway surface, adjacent safety areas and the airspace area.

B. <u>Conformance With Land Use Plan:</u>

The CT is within the geographic boundary of the Alaska Southcentral Planning Area Management Framework Plan (MFP), dated March 1980. The management of the CT is directed by the plan titled "A Management Plan for Public Use and Resource Management on the Bureau of Land Management Campbell Tract Facility" dated June 1988.

II. PROPOSED ACTION AND ALTERNATIVES

A. <u>Proposed Action</u>:

The Proposed Action is to rehabilitate the CT runway, taxiway, apron and heliports to comply with current criteria for emergency and disaster response operations. The runway and associated facilities would be rehabilitated to accommodate C-130 aircraft. The existing 150' X 5,000' runway would be rehabilitated by clearing vegetation and grubbing roots, excavating silty/soft spots and backfilling. The middle 75' would be "hardened" by resurfacing with nonfrost susceptible gravels and compacting to drain at a 1.5% to 3% cross-slope. A run-up pad and turn around area will be constructed at either end. Existing helipad pavement would be removed, the pads regraded, compacted and resurfaced with coal tar emulsion seal coat. The taxiway would be widened to 40' with 10' shoulders with a 100' wide turning radius. Vegetation would be cleared to a 190' width and grubbing would be performed within the 60' width. Runway signs would be removed during construction and replaced. The length of the construction period would be 60 days, commencing in August.

The safety areas of the runway consists of the Runway Safety Area (RSA) and the Object Free Area (OFA). The RSA is centered on the runway centerline and stretches the length and width (150') of the runway. This surface must be cleared and graded so that no object protrudes above the RSA edge elevation. This is designed to prevent damage to aircraft that strays to either side of the runway. The 270' wide OFA encompasses and stretches beyond the RSA to give aircraft additional area that is free of objects as an added measure of safety. Approximately 17.8 acres would be cleared and grubbed in the 150' wide RSA with an additional eight acres cleared within the OFA by blading 35' on either side of the RSA at a varied slope of 1.5% to 5.0% (as needed to dispose of unclassified material at grading limits). The total width of the base-bid clearing limits would be 220' to stay within the existing treeline. Excess and unsuitable soils may be placed between 75' left of the runway centerline and base-bid clearing limits, uniformly shaped to a smooth surface and graded to drain. Vegetation would be maintained at ground level in both the RSA and the 220' wide cleared section of the OFA. All work would be within the existing treeline (although some tree removal is possible), except for the taxiway improvements.

Approximately 0.25 acres of vegetation and 0.25 acres of trees, would be removed to widen the taxiway clearance zone to 190'.

In its current condition, the apron is too small to accommodate a C-130 aircraft easily. The apron would be regraded and surface course added, which would rehabilitate the apron to a very serviceable condition for parking two C-130's and smaller aircraft simultaneously. No additional clearing would be necessary.

B. No Action Alternative:

The runway, taxiway, apron and helipads would not be rehabilitated and would continue to be out of compliance with current emergency and disaster response criteria.

III. AFFECTED ENVIRONMENT

A. Critical Elements:

The following Critical Elements of the human environment are either not present or would not be affected by the Proposed Action or the Alternative:

Areas of Critical Environmental Concern (ACECs)

Environmental Justice

Farm Lands (prime or unique)

Floodplains

Invasive, Non-Native Species

Native American Religious Concerns

Threatened or Endangered Species

Water Quality (Surface/Ground)

Wetlands/Riparian

Wild and Scenic Rivers

Wilderness

1. Air Quality:

Air quality has not been pristine in the Anchorage area since the early 1900's when population increases in the area began. However, air quality varies with season and atmospheric conditions. Fire scars on the CT, as well as historical accounts, indicate the presence of natural fires and evidence of fires set by the human population of the area. Since the early 1940's, levels of smoke may have decreased as fire was, for the most part, excluded by organized fire suppression. In the proposed project area, there are no Class I air sheds, or special protection areas such as wilderness areas. Anchorage is designated through the Clean Air Act as a non-attainment area for carbon monoxide. However, the legal description of the Anchorage non-attainment area does not include the CT.

2. Cultural Resources:

No prehistoric resources have been identified on the CT. It lies within the territory claimed by the historic Dena'ina, an Athabaskan speaking people. Only spotty evidence of human use has been found indicating occupation prior to their entering the Cook Inlet area. Until approximately 11,000 years ago, glaciers covered the Anchorage bowl. The oldest site in the area dates to approximately 8,000-10,000 and 4,500 years ago at Beluga Point (Reger 1996).

Early United States Period Resources

The CT takes its name from the creek that runs through it. The creek was first reported in 1906 by the United States Geological Survey (USGS). It was most likely named after Campbell Point which was named in 1794 by Joseph Whidbey, probably in honor of Sir Joseph Campbell, governor of Jamaica in 1785 (Orth 1971).

Potter Trail

The Potter or Potter Creek Trail crossed the Anchorage bowl in a north-northeasterly direction. It started at Potter and followed the railroad for approximately four miles. It then crossed to the original railroad right-of-way which was never developed. This, in part, ran along the CT runway. After crossing Campbell Creek the trail came to a junction with another old trail following upper Campbell Creek and then to the northwest into the old Anchorage town site. Post World War II development has obliterated most traces of this trail except those which still exist in the CT and the Far North Bicentennial Park (FNBP) (Carberry 1979).

World War II Resources

Construction for Fort Richardson was authorized in June 1940. By 1942 the need for satellite airfields to the base became apparent, and four satellite airfields were authorized. These 5,000 foot airfields with revetments and taxiways were located at Campbell Creek, Goose Bay, Birchwood and Willow (Bush 1984).

In June 1942, fifty men from the 138th Infantry Regiment arrived at the newly constructed CT Airfield. There was a temporary scarcity of Quonset huts so these soldiers constructed their own quarters off the northeastern end of the runway. These quarters were 10' x 16' sod huts built from locally available materials. During this early period at the airfield there were approximately 15 of these huts plus a mess hall,

kitchen, guard huts and posts of the same basic construction (personal communication, F. Robert Grant).

3. Subsistence:

The CT lands are Federal Public Land as defined in the Alaska National Interest Lands Conservation Act (ANILCA), Section 810 and fall under the authority of the Federal Subsistence Board and the Subsistence Regulations for the Harvest of Fish and Wildlife on Federal Public Lands in Alaska. The CT lies within the Anchorage Management Unit of Game Management Unit 14C which under the current Subsistence Regulations noted above is closed to the taking of wildlife under both State (hunting and trapping) and Federal Subsistence Regulations. Further, the taking of wildlife on the CT is limited by Supplemental Rules issued on November 20, 1998 under 43 CFR 8365.1-6 that closed the CT to the use of firearms, archery equipment, traps or snares. The CT has no documented consistent use by rural Alaskans of fish or game and no knowledge of such use has become available since the inception of the Federal Subsistence Program or the issuance of the above noted Supplementary Rules.

4. Wastes (Hazardous/Solid)

The CT was used by the military and the potential exists for materials to have been buried that are hazardous. Small items of military ordnance have been found in the past and the potential exists for additional items. The BLM used the site and airfield for fire fighting and administrative purposes since the mid to late 1960s. During this period, maintenance on the airstrip may have included oiling for dust control. It is also possible that materials that would be considered hazardous today were buried on site but no records exist documenting such disposals.

B. Recreation:

The CT is a Special Recreation Management Area (SRMA) for non-motorized recreation use. Recreation management of the CT is directed by the "Management Plan for Public Use and Resource Management on the BLM Campbell Tract". There are approximately 11.2 miles of developed trails on the CT. Some of these trails link to other trails on the adjoining FNBP. The proximity of the CT to urban Anchorage places high demands on the site from a variety of users. Most recreation use occurs on the trails that were developed on old military tank trails and airplane taxiways. The runway itself is not designated for recreational uses except in the winter for dog mushing, however, casual use does occur throughout the year. Coyote Trail crosses the southwest section of the

runway and serves as a main access route to and from various CT trails, including Lore Road, Abbott Loop, and Moose Track Trails.

Access for recreation use on CT is via trails from adjoining FNBP trails, Campbell Airstrip Road, Abbott Loop Road and CT entrance road parking areas. Trail maintenance, signing and event permitting is a cooperative effort between user groups, the BLM and the Municipality of Anchorage's (MOA) Parks and Recreation Division.

Recreation users are primarily residents from Anchorage and surrounding communities. The estimated number of user days in 2001 was 39,000. Many users live close to the CT and use the area regularly for exercise, often with dogs or on horses, and training for dog mushing, skiing, running and cycling. Competitive events, including the Nordic Ski Club's Tour of Anchorage and the World Sled Dog Championship races, attract local, national and international entrants.

The types of recreation use changes with the seasons. During the snow season, use is predominantly dog mushers, skiers, and skijorers, with lesser use by horse riders, joggers and walkers, including people walking pets. CT contains an important part of the Alaska Sled Dog Racing Association (ASDRA) trail system. In the winter, the trail is used intensively for training and competitive dog mushing events. Trails are groomed by the Nordic Ski Club, the North American Skijoring and Ski Pulk Association (NASSPA), the ASDRA and the BLM.

During the snow-free season, CT recreationists include cyclists, horse riders, joggers, and walkers, including people walking pets. A small number of competitive and organized events are held on CT during the snow-free season.

C. Soils:

The soils of CT are typically gravelly, well drained glacial drift with an overlying mantle of silty loess about 15 to 18 inches thick. These soils typically have a thin gray silt upper layer over reddish brown to yellowish brown layers about 6 to 12 inches thick. The lower part of these layers and the substratum consist of very gravelly sand or sandy loam that contains many stones and boulders.

Well drained sites have few or moderate limitations for building or other types of construction and are capable of producing commercial stands of timber (USDA, SCS Exploratory Soil Survey of Alaska, 1973).

Soils on CT have been impacted by roads, building sites, an existing runway, World War II airfield and revetments, trails and staging areas. Some of these

areas have grown over with vegetation, but the soil profile remains altered and is unlikely to return to pre-disturbance levels. The proposed runway upgrade will also involve rearranging existing soils/gravels on the existing runway and adding new material to it as needed.

D. <u>Vegetation</u>

The native vegetation on the CT is a result of the maritime subarctic climate, soil types, and previous disturbance. Plant communities that are typical of south-central Alaska and the subarctic environment are found on the CT. The vegetation mosaic is the result of human activities, primarily military use during the 1940's and 1950's, that disturbed existing native plant communities. Abandoned previously disturbed areas are gradually following a successional pattern back to climax forest conditions. Most of the proposed project area has been periodically mowed.

The forested areas are composed of an uneven aged stand of mature cottonwood and birch with a minor component of immature white spruce. Dominant cottonwood trees in the stand are approximately sixty years old and are remnants of World War II era construction activity, while smaller diameter components of birch and spruce range in age from 15 to 35. The few dominant cottonwoods on the site average 65 feet in height and 14 inches in diameter, while the majority of the remaining birch and spruce stems are approximately 20 to 35 feet tall and two to six inches in diameter.

The forest stand that would be disturbed by the taxiway widening is located on a previously disturbed site with evidence of substantial soil ruts and berms caused by tracked vehicles (possibly tanks during WWII). Many of the dominant trees are growing out of the bermed soil from this disturbance. The timber is of average quality, but given its small size and relative low volume per acre, it is not considered to have commercial value.

The under story vegetation consists of forbs, lichens, mosses and fungi, and occasional woody shrubs. Shrubs were mowed in the last couple of years to just a few inches in height in most of the proposed action area. The resultant groundcover in the runway area has a predominant cover of non-native species (clover, pineapple weed, etc) interspersed with mixed-shrub resprouts. There are no rare or sensitive plant species known to occur in the area.

E. Visual Resources:

Scenic quality is best described as the overall impression retained after traveling through or being within an area of land. The visual resources in the project area can be divided into two categories of scenic quality. The area surrounding the administrative compound, which includes administrative offices and warehouse buildings, is Class C scenic quality and the remaining, less developed area, is Class B.

Some of the less developed portions of CT contain areas that have been historically disturbed by man-made intrusions. These include the runway, taxiways, airplane parking pads, tank trails, secondary roads and communication sites. In many cases, the open areas created by these developments have enhanced the scenic quality of the area by revealing vistas of the Chugach Mountains and providing visual relief from the surrounding thick woods and forest canopy. Overall, there is a predominant rural visual setting within this area. Recreation users on the designated trail system can be assured a quality visual experience free from most modern intrusions.

F. Wildlife:

The site of the Proposed Action and surrounding area supports a variety of animal species. Resident populations include moose, porcupine, snowshoe hare, microtine rodents and at least 50 species of resident and migrant birds. Non-resident mammal species that have been seen include fox, coyote, wolf, lynx, brown bear and black bear. These animals move through the area, probably from the Chugach Mountains during seasonal changes and heavy snowfall in search of prey species. Many migrant birds pass through the area during spring and fall migration, including several raptor and many neo-tropical land bird species. Shrub and mixed spruce and birch forest habitats provide nesting habitat for land birds and raptors, particularly Bald Eagles. There is one species of amphibian, the wood frog, that occurs in the area. There are no wetlands on the site of the Proposed Action. There are no threatened and endangered species in the area.

IV. ENVIRONMENTAL CONSEQUENCES

A. Impacts of the Proposed Action:

1. Critical Elements:

a. Air Quality:

There would be short term impacts on air quality from the exhaust fumes of the equipment. Dust would increase from the placement of surface material, vegetation clearing, dirt work and grubbing operations. During the performance of any work under the Contract, whether at the project site, borrow pits, material sites, or on public roads, the Contractor will be required to provide dust

control. Dust shall be kept at a level that will not cause a safety hazard or nuisance to the public.

b. Cultural Resources:

Since the entire project will occur on previously disturbed areas, there should be no adverse impacts upon cultural resources.

c. Subsistence:

The Proposed Action would not restrict subsistence uses, decrease the abundance of subsistence resources, alter the distribution of subsistence resources, or limit subsistence user access from currently existing conditions. Presently, there are no known users of subsistence resources.

d. <u>Wastes (Hazardous/Solid):</u>

The majority of work will be confined to the existing runway and cleared areas. The potential for finding buried hazardous wastes is low since most surface disturbance is on the existing runway and limited digging below existing fill is planned.

2. Recreation:

During the 60 day construction period, recreation use will be excluded from the runway area and trails crossing the runway. Trails outside the construction zone would receive additional pressure as use shifts to other areas. The change in use pattern will cause some confusion to CT users unless adequate information (signing and notices) is provided in advance. Approximately 450 feet of Coyote and Lore Road Trails will be permanently rerouted to avoid crossing the rehabilitated runway. Trail design will incorporate techniques to improve runoff characteristics, resulting in a drier, more stable trail. This reroute will also increase visual quality and provide a safer trail for users.

Recreationists on the CT will experience a substantial increase in noise which will disrupt the quiet experience many are seeking. Safety of users, if any stray into the construction zone, may be at higher risk. Dust and exhaust fume inhalation by recreation users is possible if any cross downwind of construction activities.

3. <u>Vegetation:</u>

Most of the project area was mowed in previous years but roots and sprouts are present over most of the area. Approximately 17.8 acres would be to all intents and purposes permanently cleared and grubbed in the 150' wide RSA with an additional 8 acres cleared by blading and regularly mowed 35' on either side for a 220' total width. Vegetation would be maintained at ground level in both areas. All work would be within the existing treeline, except for the taxiway improvements. Approximately 0.25 acres of vegetation and 0.25 acres of trees, would be permanently removed to widen the taxiway clearance zone to 190'. Invasive and other non-native species could increase due to the regular disturbance of native vegetation and the influx of aircraft carrying seeds from other areas.

4. Soils:

Upgrading the existing runway has no significant change on the runway substrate. The surface will change somewhat with the addition of new surfacing materials similar to what exists there now. The new runway will be similar in appearance to the existing one with no major impacts to surrounding soil characteristics. Given the nearly level grade of the runway and the porous nature of the runway surface and subsurface, erosion from water runoff is not expected to be a runway stability factor. Also wind erosion is not expected to be a problem due to the tall woody vegetation along the edges of the runway and the coarse gravel surface.

5. Visual Resources:

Visual resource quality will be compromised throughout the duration of the 60 day construction project. Removal of trees and taller shrubs for the taxiway will open up more of the area for scenic vistas, although the CTF buildings will be more visible from Coyote Trail. Regrading and resurfacing the runway would permanently alter its overall appearance and diminish the rural visual setting. Work on the runway will stay within the existing treeline, so other trails would still be screened from the rehabilitation project. The Coyote and Lore Road Trails reroute would be placed within the Southwest treeline.

6. Wildlife:

Currently, the regrowth of shrubs on the existing runway provides some winter browse for moose. The clearing and grubbing, compaction and resurfacing of the runway would remove that food source from the CT, creating more browse pressure on remaining vegetation. The clearing of trees and shrubs on the taxiways, aprons and around the heliport will

remove nesting, migration and cover habitat for forest birds. There is currently a fall migration bird banding station situated on the east end of the runway, with the net array setup in shrub habitat on the forest edge. If additional clearing is later required to accommodate approach aprons on the east end of the runway, the banding stations shrub and forest habitats would be removed, effectively eliminating the banding station. The net positions could be relocated to another place on the CT, but the repeatability of banding data in future years could not be maintained.

Both black and brown bears frequent CT in the summer months (May-October) in search of food. Garbage and food associated with construction crews could attract bears to the site. Potential conflicts between people and bears could occur, causing bears to be destroyed in defense of life and property.

7. <u>Administrative Facility</u>:

The construction will involve the movement of equipment and material down the CTF access road, behind the shops and to the runway. The increase in activity will be apparent to staff and visitors to the facility. The presence of large gravel trucks will present an increased risk of accident for both pedestrians and vehicle drivers.

Construction traffic behind the shop area will destroy the lawn grass that has established on the road and the area will be regraded. Dust will be a problem unless the road is watered frequently. Some increase in noise will likely be noticed by CTF employees and visitors.

There could be an increase in security risk to the facility depending on the days and hours the gate is open to allow construction access.

B. Impacts of the No Action Alternative:

If the runway, taxiway and apron are not rehabilitated, there would be no impacts to the environment. However, the facility would continue to be out of compliance with current emergency and disaster response criteria.

C. Cumulative Impacts:

The exhaust fumes and dust will add to the particulate and chemical pollution in the Anchorage Bowl. The amount of pollutant will be very small and of short duration.

The loss of vegetation adds to the loss of habitat and food source for wildlife that is rapidly occurring in the Anchorage Bowl. Cumulatively this is less than 2.0%

of the entire CT. The acreage is additive to the acreage of cleared and irretrievable habitat loss created by roads, utility lines, buildings and other disturbances on CT and within the Municipality. The disturbance to vegetation adds additional potential habitat for invasive and/or non-native plant species inside the CT.

D. Mitigation Measures:

- 1. Approximately 450 feet of Coyote and Lore Road Trails should be permanently rerouted to avoid crossing the rehabilitated runway. Recreation users should be kept informed of the status of the project, location of the work and temporary trail closures. This can be accomplished by signing at trail head and public notices.
- 2. Soils should not be driven on while wet to reduce compacting and rutting. Any areas outside of the 220' clearing limits and taxiway that are damaged should be smoothed and stabilized by mulching and/or revegetated. Any areas outside the scope of this project where vegetation is removed should be protected and or revegetated.
- 3. All food and garbage should be stored out of reach of bears and removed from the site on a daily basis.
- 4. Equipment brought into the area should be free of weed sources. Invasive species should be monitored and removed if necessary. Seeds used for revegetation should be certified weed-free.
- 5. Only native plant species local to the area should be used for revegetation along the runway. The helipad should be revegetated with a lawn grass mixture to form a continuous sod.
- 6. A Safety Plan should be developed for the contractor and staff to make them aware of the increased risk of accidents during construction. Signs, E-mail notices, and other information should be provided to staff and visitors to alert them of increased hazards.
- 7. If hazardous materials are discovered during construction, work must stop and the BLM authorized representative notified. The site where any materials are discovered must be inspected by a qualified hazardous materials person and a plan for remediation should be developed.
- 8. The 35 feet next to the timber edge on each side of the runway should not be mechanically maintained to allow the existing shrub belt to reestablish. Shrubs

should be allowed to reach a height of up to six feet in height before periodic cut back every few years. Maintenance should be done in late April to allow the previous year's growth to be available to moose wintering in the area.

9. Dust abatement should be applied during the entire construction period when access roads and the work areas become dry and dusty.

V. CONSULTATION AND COORDINATION

A. <u>Persons and Agencies Consulted:</u> Carol Hammond - Engineering

B. <u>List of Preparers:</u>

Debbie Blank - Vegetation
Jeff Denton - Subsistence
Dave Kelley - Soils
Donna Redding - Cultural Resources
Jake Schlapfer - Recreation and Visual Resources
Bruce Seppi - Wildlife